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Country Attractiveness: Analysis of the Main Factors

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ABSTRACT

Attracting investment is a **relevant** issue for any economy. The **aim** of the research is to study the factors affecting the inflow of foreign direct investment (FDI) by the example of countries leading in attracting FDI and countries of the Eurasian Economic Union (EAEU). The author uses both qualitative and quantitative **methods** to analyze research data of other authors, reports of international organizations and the World Bank database. The author did econometric calculations using the application package Stata 14. A linear regression model using the least-squares method was built. The author selected several factors that presumably affect FDI inflows to the EAEU countries. The calculations were based on the combined panel data analysis model used in the BRICS and MINT countries, which allowed the author to calculate the degree of influence and significance of a number of variables of FDI inflows. The study shows that political stability is more important than the inflation rate, the volume of foreign trade and final consumption expenditure. The author **concluded** that poor institutional development hinders investment. In particular, the negative institutional factors are non-transparent regulation policy, the dominance of public property and the lack of proper investment protection system, low degree of rule of law and limitation of economic rights. Further study of issues related to attracting FDI should consider the trends of mass digitization since the introduction and implementation of digital technology are becoming an integral part of the competitiveness of the modern economy.

Keywords: foreign direct investments; investment attractiveness; macroeconomics; open economy; competitiveness

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INTRODUCTION

With the rapid growth and development of digital technologies, maintaining the competitiveness of the economy requires constant injections of capital to finance and implement various innovations. Attracting foreign investment for this purpose has several positive sides: foreign capital expands the country's capabilities, brings new technologies and business culture. It is important to determine the factors influencing investors' decisions to increase the FDI inflows in a particular county. Obviously, a number of economic and political factors are crucial, as well as the level of institutional development of the country and some other qualitative indicators. The indicators that determine the investment attractiveness are the size of the market, population, openness of the economy, macroeconomic stability, political stability, development of various economic and political institutions. A study of the list of countries successful in attracting FDI by various comparable indicators made it possible to identify economies leading in two or more indicators. These include Singapore, Hong Kong, Australia, and the Netherlands. In this regard, one of the questions of this study was the search for those factors that determine the leadership of these economies.

The statistical data allowed us to identify the economies of the countries leading in FDI, which differ from each other and contradict the results of a number of studies. In particular, they differ significantly in absolute indicators of population and market capacity, in the degree of economic openness, in territory and population density. The indicators assessing political stability and economic freedom also differ. However, some factors are similar in all four countries and are dominant in terms of investment attractiveness. Other common factors include strengths highlighted by analysts at the World Economic Forum: macroeconomic stability, a strong financial system and infrastructure, and a skilled workforce. As for the latter indicator, it should also be noted that in all these countries, more than half of the population speaks English. Studying the experience of leading economies in attracting FDI allows us to formulate the following research question: Do the selected factors affect the attraction of foreign direct investment to the EAEU countries and which of them are the most significant?

Statistics show that in terms of the relative volumes of net FDI inward flows, the EAEU countries do not lag behind a number of developed countries, which cannot be said for FDI per capita. At the same time, the relatively low volumes of attracting foreign investment may be a result of a number of factors also noted in the Global Competitiveness Report. In particular, according to the Global Competitiveness Index, the skillset of graduates, the quality of road infrastructure was assessed at an average level, and the ease of finding skilled employees was slightly above average. The efficiency of the border clearance was assessed below average, which, with other indicators being on the same level, may negatively affect the investment decisions of foreign investors. In addition, the indicators of economic freedom (Belarus, Kazakhstan, Kyrgyzstan, and Russia are classified as moderately free countries, Armenia is classified as free) are quite low compared to countries at high levels of FDI inward flows, and the indicators of political freedom are significantly low. In general, the analysis of investment attractiveness in the EAEU countries allows us to conclude that the presence of a number of favorable factors, despite other factors are at the same level, the ineffective activity of the institutions of economic and political regulation is a circumstance that hinders the growth of investments. Based on the analysis and generalization of a number of studies devoted to the search and assessment of factors affecting the investment attractiveness of the country, several factors were selected that presumably affect the inflow of FDI to the EAEU countries. The basic model for the calculations was a combined panel data analysis model applied to the BRICS and MINT countries [1], which allowed the authors to calculate the degree of influ-

ence and significance of a number of variables on the volume of FDI inflows. Thus, the article presents a literature review that allows us to identify all possible factors that determine the inflow of FDI and based on the statistical data, the countries with high volumes of FDI are identified. Studying the experience of these countries allowed us to determine which factors prevailing in the literature determine the inflow of foreign direct investment into these economies, and which do not.

METHODOLOGICAL BASIS OF RESEARCH

This study is aimed at solving the following problems.:

- modern literature review on the analysis of factors affecting FDI inward flows in order to identify the most significant ones;
- statistical analysis of the selected factors using the example of countries leading in FDI inward flows;
- study and assessment of the impact of the identified factors on the inflow of investments to the countries of the Eurasian Economic Union (EAEU).

The object of the research is foreign direct investment, the subject is the factors that determine the inward flow of investment. The research is based on the use of both qualitative and quantitative methods of analysis. The qualitative analysis is based on modern research on the factors that determine FDI in general and on the example of individual countries. The quantitative analysis is based on international organizations' reports (World Investment Report 2019, Global Competitiveness Report 2019), World Bank databases, official websites of statistical services, and other relevant organizations. The econometric calculations were carried out using the Stata 14 application package.

A comprehensive study of the factors of investment attractiveness for a group of leading economies ensures a novelty of this research as well as a calculation of a panel data analysis model to assess the degree of influence and significance of a number of variables on the FDI inward inflows in the EAEU countries.

The theoretical significance of the study is presented in an extensive quantitative and qualitative analysis and a detailed comparison of the factors of investment attractiveness of the EAEU countries leading in FDI, taking into account the competitiveness indicators.

The practical significance of the study concerns the creation of a statistical and analytical base for future study of the new factors affecting the inflow of FDI to these countries, in particular, factors driven by the formation of the digital economy.

LITERATURE REVIEW

Attracting FDI is always relevant and therefore there are many studies devoted to the analysis of factors increasing FDI flows into the country. Depending on the specifics of the sample and the subject of research, various indicators of investment attractiveness are distinguished with an appropriate degree of investment sensitivity to each of them.

The economic literature identifies the factors influencing the investment attractiveness of a country:

- market size;
- degree of urbanization;
- level of human capital development;
- level of economic integration;
- trade;
- labour cost;
- exchange rate volatility;
- political stability, etc. [2–4].

A review of determinants of FDI conducted by S. Tocar, shows that market size and infrastructure facilities have a positive impact on the foreign investment, while the level of salaries, corruption, corporate tax rates and political risks have a negative correlation with FDI inflows [5, p. 188].

Studying the FDI volumes in sub-Saharan economies, P. Jaiblai and V. Shenai tested the hypothesis about the influence of the following factors on investment inflows: inflation, economic openness, exchange rate volatility,

infrastructure, market size, and income level. Based on the results of econometric calculations in the long term, the authors identified a significantly positive effect of inflation and infrastructure, and insignificant but positive effect of the exchange rate and economic openness, and a negative effect of income level and market size [6, p. 13–15].

S. Boga conducted his research in the same region, analyzing such variables as the economic growth rate, foreign trade turnover, the degree of financial sector development, inflation, infrastructure, and the availability of natural resources [7].

A. Ridzuana et al. using the example of the countries of the Association of Southeast Asian Nations (ASEAN-5), built an equation of the dependence of FDI on economic growth, domestic investment, foreign trade turnover, expenditures on the final consumption of goods and services and the level of development of the financial sector [8, p. 158].

N. Mamingi et al. added the indicator of telephone lines per 100 people as an indicator of infrastructure development to the same macroeconomic factors on the example of the countries of the Eastern Caribbean region [9, p. 87].

In the context of general studies of investment attractiveness, A. Cieślik stands out, who studied the dynamics of FDI inflow to Poland from the EU-15 countries, using such indicators of comparisons between countries as the ratio of physical and human capital to the number of employees, the geographical distance between the capitals of the two countries and a number of other indicators [10].

G. O'Meara analyzed the dependence of FDI on the example of 99 countries for the following indicators: GDP per capita, income tax, volumes of exports of goods and services, education, household expenditures on final consumption as an indicator of total demand, etc. [11, p. 4–7]. The econometric analysis led the author to the conclusion that the population, GDP per capita, household final consumption expenditure, and broadband coverage of the country are statistically significant for the foreign investment flows, while education and corporate tax rate are insignificant.

K. Dellis et al. studying FDI flows in the EU countries, focused on the quality of institutions, considering this factor not only as key for investors but also as a factor influencing a number of other indicators of economic development that attract potential investors. The authors' research was aimed at studying the influence of political institutions, the labor market and the market for goods and services regulations, as well as a number of other regulatory mechanisms on FDI inflows, for which the global competitiveness index and Heritage and the Fraser Economic Freedom were taken [12, p. 8–14]. To assess the quality of institutions, the indicator of the World Governance Indicators database was taken. At the same time, the equation of dependence of FDI included such indicators as the volume of nominal GDP, as well as the percentage ratio of state tax revenues and the volume of foreign trade turnover in relation to GDP. The authors' research has confirmed the importance of quality political and economic institutions for attracting FDI.

J. Günther, M. Kristalova noted the importance of having effective functioning institutions of economic regulation, especially for economies in transition [13]. While recognizing the priority of such factors as market size, labor costs, and the degree of integration into the global economy, the authors emphasize the institutions that continue to remain underdeveloped in the countries of Central and Eastern Europe.

The impact of institutional development on FDI inflows was also discussed by S. Sabir, A. Rafique, K. Abbas [14], and N. Mahmood et al. [15], emphasizing that the role of institutional development in some cases is no less important than a number of macroeconomic factors. The same idea is expressed in the works of A. Cieślik, G. Hien Tran [16], M. Asiamah, D. Ofori, J. Afful [17], M. Epaphra, J. Massawe [18] and a number of other authors. Thus, S. Sajilan et al. included in the list of explana-

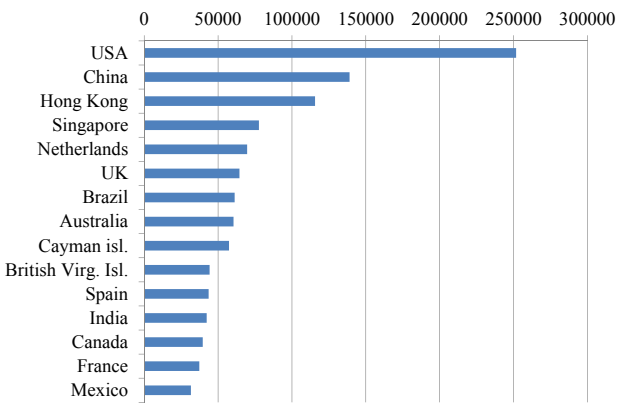

Fig. 1. **The countries with the highest FDI, bln USD**

Source: Based on the UNCTAD World Investment Report 2019.

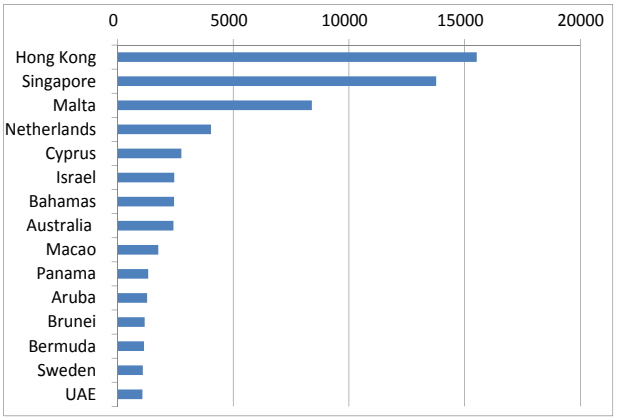

Fig. 2. **The countries with the highest FDI per capita, USD**

Source: Based on the UNCTAD World Investment Report 2019 and World Bank database.

tory variables such factors as government stability, transparency of democracy, corruption, and the quality of bureaucratic procedures [19, p. 469]. Some experts cite the availability of natural resources as the factor attracting investment, which contradicts the opinion of S. Poelhekke et al. that countries deprived of resources attract more FDI than resource-rich economies [20, p. 1].

In turn, H. Löwendahl emphasizes the need to promote investments, which implies creating a brand, raising awareness and perception of the country by potential investors [21].

A website and a separate structure responsible for promoting the country in the context of attracting investment is a very significant marketing tool. Trends in the development of the modern global economy adjust to the existing relationships, as well as the attractive business environment. The fourth industrial revolution, driven by the rapid development and adoption of digital technologies, involves a revision of the process of creating and distributing value, which effectiveness largely depends on the ability of enterprises to accept and implement digital technologies. [22][1].

The digital economy leads to the need to define new rules and adapt existing regulatory norms to them, and also creates new opportunities for business: the transformation of all sectors of the economy may lead to increased quality of production of goods and services at lower costs[2]. The transporting costs of digital products are close to zero, ensuring high geographic mobility of digital products compared to traditional manufactured goods. Thus, digital technologies are becoming a more significant factor of production relative to labor, land, and the availability of natural resources [23]. In these conditions, the country's potential for the introduction, use, and development of information and communication technologies (ICTs) becomes another factor that largely influences foreign investors' decisions. This factor is specifically important for internet-based enterprises[3]. Analysts at the World Economic Forum also recognize the role of digital technologies and their diffusion in shaping the competitiveness of the economy, as reflected in the Global Competitiveness Report, which is precisely the "voice of the business community" [24]. Based on the indicators included in the report, a number of new investment attractiveness factors can be identified that complement the list of traditional

[1] World Economic Forum. Global Future Council on Digital Economy and New Value Creation. URL: https://www.weforum.org/communities/the-future-of-the-digital-economy-and-society (accessed on 05.03.2020).

[2] UNCTAD. Digital Economy Report 2019, pp. xvi–xviii. URL: https://unctad.org/en/PublicationsLibrary/der2019_en.pdf (accessed on 05.03.2020).

[3] UNCTAD. World Investment Report 2017. Chapter IV. Investment and the Digital Economy. URL: https://unctad.org/en/PublicationChapters/wir2017ch4_en.pdf (accessed on 05.03.2020).

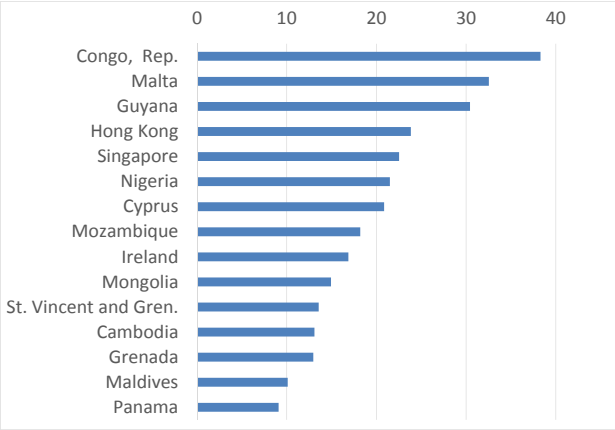

Fig. 3. **The countries with the highest FDI net inflows, % of GDP**

Source: Based on the World Bank database.

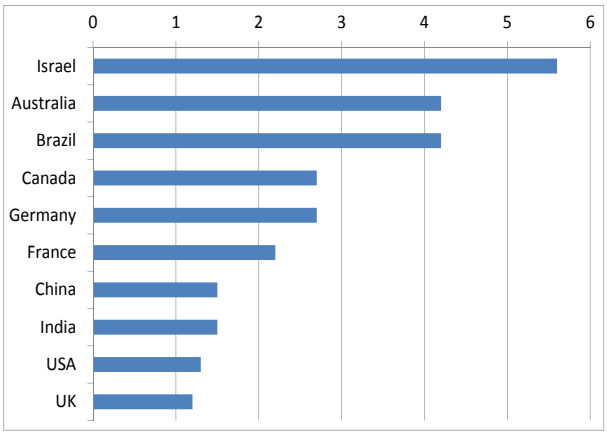

Fig. 4. **FDI net inflows, % of GDP**

Source: Based on the World Bank database.

indicators listed above. New factors include indicators such as technology governance, ICT adoption (with several indicators reflecting the expansion of ICT), digital skills of the active population, and a number of other indicators.

FACTORS OF INVESTMENT ATTRACTIVENESS OF COUNTRIES SUCCESSFUL IN ATTRACTING FDI

According to the 2019 World Investment Report, the top 20 countries can be identified as recipients of foreign direct investment. As a comparable indicator, we calculated the volume of investment per capita, which allowed us to see a different picture. The list of countries with the highest FDI inflow is diverse. This list includes economies that differ in many indicators. Only Hong Kong, Singapore, the Netherlands, and Australia lead on both indicators (*Fig. 1–3*).

FDI-to-GDP ratio is often used to assess FDI volumes. The list of countries — leaders in this indicator according to the World Bank — also differs from the mentioned above. The undisputed leaders included in all three lists are Hong Kong and Singapore (*Fig. 1–3*). Some of the world's largest economies are significantly behind in terms of the share of FDI in GDP (*Fig. 4*).

Summing up the above statistics, we can distinguish four countries successful in attracting FDI: Australia, Hong Kong, the Netherlands, and Singapore, which are compared in relation to a number of indicators as presented in the Global Competitiveness Report (GCR) (*Table 1*).

The data show that for most of the investment attractiveness indicators listed above, Hong Kong is close to the maximum values, while Australia shows indicators at a level slightly above the average score. At the same time, Singapore is the leader in the overall competitiveness rating among 141 countries, while Hong Kong and the Netherlands are ranked as third and fourth. And Australia is in 16th place in the ranking. It is notable that the United States, which is ranked third, is behind in some FDI indicators.

GCR analytics revealed the strengths of each of the economies:

- **Australia**: macroeconomic stability, skills, developed financial system. The infrastructure is the weakness. In many respects, the country's economy is similar to the average indicators of the OECD countries [24].
- **Hong Kong**: macroeconomic stability, financial system, and commodity market, infrastructure, ICT implementation. The disadvantages of the economy are limited potential, as well as low indicators for the protection of the workers' rights [24].
- **The Netherlands**: the country's economy in terms of the index is the most competitive in Europe and has an advantage in most components, in particular, in terms of macro-

Table 1

The factors of FDI attractiveness in the most attractive countries

	Australia	Hong Kong	Netherlands	Singapore
Property rights	6.1	6.2	6.1	6.4
Quality of road infrastructure	4.9	6.1	6.4	6.5
Inflation	2%	1.9	1.5	0.5
Skillset of graduates	4.8	5.1	5.5	5.4
Ease of finding skilled employees	4.6	4.9	4.8	5.1
Extent of market dominance	4.3	4.9	5.2	4.8
Competition in services	5.2	6.2	5.9	5.7
Prevalence of non-tariff barriers	5.3	6	5.3	6
Complexity of tariffs	6.9	7	2.9	6.9
Border clearance efficiency	3.9	3.8	3.9	3.9
Cost of starting a business % of GDP per capita	0.7	1.1	4.2	0.4

Source: Based on the WEF Global Competitiveness Report 2019, p. 66.

economic stability, quality of infrastructure, skills of qualified labor resources, developed innovation ecosystem and institutional environment.

- **Singapore**: an economy that has surpassed the United States in terms of its indicators. The strong points are infrastructure, labor market, financial system, macroeconomic stability, quality of public institutions. Additionally, Singapore has the most open economy.

At the same time, the countries differ significantly in terms of absolute indicators of market capacity and population. The final consumption expenditure in Singapore accounts for less than half of GDP, which indicates a rather low level of domestic demand, especially when compared to the other three countries. Singapore and Hong Kong, which are notable for their low population, are leading in one of the key indicators of economic openness — the volume of foreign trade, which is more than three times the country's annual output (*Table 2*), and in terms of the share of exports[4].

The United States, one of the Netherlands' main trading partners[5], notes that the strengths of the Dutch economy, which in-

[4] The World Bank. Export of Goods and Services. URL: https://data.worldbank.org/indicator/NE.EXP.GNFS.ZS?most_recent_value_desc=true (accessed on 05.03.2020).

[5] OECD. Netherlands. Trade and investment statistical note. URL: http://www.oecd.org/investment/NETHERLANDS-trade-investment-statistical-country-note.pdf (accessed on 05.03.2020).

Table 2

Macroeconomic indicators of investment attractiveness of countries leading in attracting FDI

	Australia	Hong Kong	Netherlands	Singapore
Market size, GDP (PPP), USD million, 2018*	1 291 189.88	481 309	970 604.94	572 503.97
Population, thousands, 2018**	24 992.37	7415	17 231	5638
Final consumption, % of GDP, 2018***	75.1	78.2	68.4	45.5
Foreign trade turnover, % of GDP, 2018****	43	377	158	326
Political stability and absence of violence/terrorism *****	82.86	74.76	78.10	98.57
Economic freedom index******	82.6 (ranks 4th)	89.1 (ranks 2nd)	77 (ranks14th)	89.4 (ranks1st)

Source: Based on the World Bank database, The Worldwide Governance Indicators, 2020 Index of Economic Freedom.

Notes: * The World Bank. GDP, PPP. URL: https://data.worldbank.org/indicator/NY.GDP.MKTP.PP.CD?most_recent_value_desc=true (accessed on 05.03.2020).

** The World Bank. Population, total. URL: https://data.worldbank.org/indicator/SP.POP.TOTL?most_recent_value_desc=true (accessed on 05.03.2020).

*** The World Bank. Final consumption expenditure. URL: https://data.worldbank.org/indicator/NE.CON.TOTL.ZS?most_recent_value_desc=true (accessed on 05.03.2020).

**** The World Bank. Trade. URL: https://data.worldbank.org/indicator/NE.TRD.GNFS.ZS?name_desc=false (accessed on 05.03.2020).

***** The World Bank. Worldwide Governance Indicators. URL: https://info.worldbank.org/governance/wgi/ (accessed on 05.03.2020).

****** The Heritage Foundation. 2020 Index of Economic Freedom. URL: https://www.heritage.org/index/ranking (accessed on 05.03.2020).

crease its investment attractiveness, are political and macroeconomic stability, a highly developed financial sector, geographic location, skilled labor, and logistics. in terms of communications. Overall, the Netherlands is one of the largest recipients of FDI, accounting for 16% of all US outbound investment[6]. The United States as an investor country pays attention to a number of institutional features of the country and such indicators as the corruption perceptions and the global innovation index. The key components of the country's exports are chemical products and food and beverages, as well as the service sector, which has a large share of inward FDI[7].

[6] US Department of State. 2019 Investment Climate Statements: Netherlands. URL: https://www.state.gov/reports/2019-investment-climate-statements/netherlands/ (accessed on 05.03.2020).

[7] OECD. Netherlands. Trade and investment statistical note, p. 7. URL: http://www.oecd.org/investment/NETHERLANDS-trade-investment-statistical-country-note.pdf (accessed on 05.03.2020).

Singapore is one of the main recipients of US investments. At the end of 2018, the Netherlands ranked 4th in terms of FDI in the country, yielding unconditional leadership to the United States[8]. Singapore is attractive for U.S. companies primarily due to transparency, lack of corruption (according to the corruption perception index in 2019, Singapore ranked 4th with an indicator of 85 out of 100)[9], business-friendly laws and regulations, tax structure, intellectual property protections, customs facilitation, and well-developed infrastructure[10]. The financial and insurance services sectors are leading in attracting FDI to Singapore is (53.4% of total FDI inflows as of the end of 2018). The share of industrial production, wholesale and retail trade is 11.6 and 17.8%, respectively.

Australia, among the four countries, is fundamentally different in geographic location and population density. The country has the world's 2nd lowest population density after Mongolia with 3 people per 1 sq. km of land area as of 2018[11]. Thus, Australia has more prospects for extensive growth but is limited in terms of human resources. The United States is also the main investor for Australia[12], attracted primarily by the availability of natural resources and mining, followed by investment in real estate[13]. The Australian authorities cite economic stability, strategic location, expanding trade networks, as well as political stability and good governance as the main factors determining the country's leading position in the world in terms of attracting FDI[14].

A robust legal services sector is a distinctive feature of the Hong Kong investment climate that attracts many international companies to locate their offices outside the country of origin in Hong Kong[15]. The high FDI inflows are mainly attributable to the Belt and Road Initiative and the fact that Hong Kong operates under a "one country, two systems" principle, given that Hong Kong is legally a Special Administrative Region of China. At the same time, the Hong Kong authorities are pursuing a policy of developing innovation and technology, attracting and implementing large volumes of investment in research and development, as well as in the development of the financial services sector. The attractive features of the Hong Kong economy for foreign investment include a business-friendly tax climate, political stability, freedom of the press, skilled labor, and a favorable geographic location[16]. Among the weaknesses are the high costs of real estate (including rental of premises for offices, shops, etc.) and labor, as well as a high degree of dependence on the financial sector. The main investments in Hong Kong come from China, some offshore zones, the UK, the Netherlands, the USA, and Japan.

[8] Singapore Department of Statistics. Foreign Direct Investment in Singapore 2018, p. 2. URL: https://www.singstat.gov.sg/-/media/files/publications/trade_and_investment/fdi2018.pdf (accessed on 05.03.2020).

[9] Transparency International. Corruption Perception Index 2019. URL: https://www.transparency.org/cpi2019?/news/feature/cpi-2019 (accessed on 05.03.2020).

[10] US Department of State. 2019 Investment Climate Statements: Singapore. URL: https://www.state.gov/reports/2019-investment-climate-statements/singapore/ (accessed on 05.03.2020).

[11] The World Bank. Population Density. URL: https://data.worldbank.org/indicator/EN.POP.DNST?most_recent_value_desc=true (accessed on 05.03.2020).

[12] Australian Government. Department of Foreign Affairs and trade. Statistics on who invests in Australia. URL: https://www.dfat.gov.au/trade/resources/investment-statistics/Pages/statistics-on-who-invests-in-australia (accessed on 05.03.2020).

[13] US Department of State. 2019 Investment Climate Statements: Australia. URL: https://www.state.gov/reports/2019-investment-climate-statements/australia/ (accessed on 05.03.2020).

[14] Australian Government. Department of Foreign Affairs and trade. Australia remained in the top ten global destinations for FDI in 2017. URL: https://www.austrade.gov.au/international/invest/investor-updates/2018/australia-remained-in-the-top-ten-global-destinations-for-fdi-in-2017 (accessed on 05.03.2020).

[15] The Government of the Hong Kong Special Administrative Region. Invest HK. Quarterly Newsletter. April, 2019. URL: https://www.investhk.gov.hk/sites/default/files/2019.04-newsletter-en.pdf (accessed on 05.03.2020).

[16] Nordea trade portal. Country profile: Hong Kong. URL: https://www.nordeatrade.com/en/explore-new-market/hong-kong/investment (accessed on 05.03.2020).

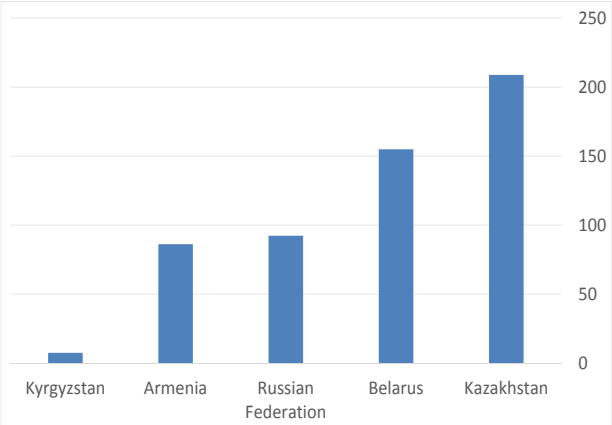

Fig. 5. **FDI per capita in EAEU, USD, 2018**

Source: Based on the UNCTAD World Investment Report 2019 and the World Bank database.

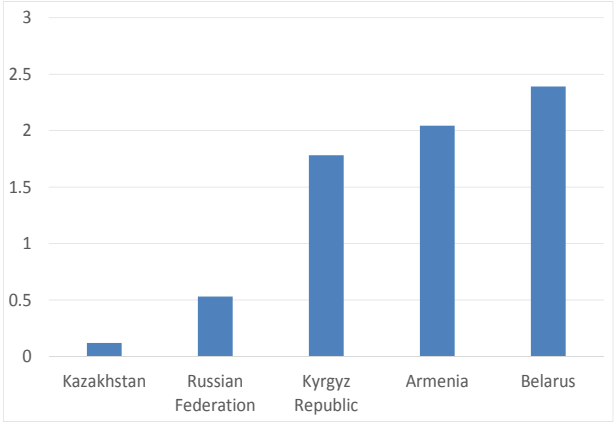

Fig. 6. **FDI net inflows in EAEU, % of GDP, 2018**

Source: Based on the UNCTAD World Investment Report 2019 and the World Bank database.

FACTORS OF THE INVESTMENT ATTRACTIVENESS OF THE EAEU COUNTRIES

The main indicator of comparative analysis is the net FDI inflows share of GDP, which for most EAEU countries is at the same level as for the mentioned-above developed economies. In terms of the FDI share of the population, there is a noticeable lag behind the world's leading countries and a significant gap between countries within the integration bloc (*Fig. 5, 6*).

Kazakhstan and Belarus lead in the number of investments per capita, and Belarus and Armenia — in terms of the FDI as% of GDP. *Table. 3, 4* illustrate the extent of FDI inflows determined by the factors listed in this paper. In this context, the analysis is limited as data for Belarus are not available in the Global Competitiveness Report. Nevertheless, the available statistics allow us to identify a number of common patterns for all countries:

- the quality of roads infrastructure is assessed by respondents at the average level;
- the quality of the road connectivity in Armenia and Kyrgyzstan is significantly lower than in Kazakhstan and Russia;
- the skillsets of graduates are assessed at the average level;
- the border clearance efficiency was assessed at the level significantly below average.

In addition, it can be noted that the overwhelming majority of indicators for all the listed countries are rated below 5 out of the maximum 7.

Belarus, Kazakhstan, Kyrgyzstan, and Russia are moderately free countries, while Armenia is a predominantly free economy. At the same time, in terms of the OECD FDI regulatory restrictiveness index of EAEU countries[17], Armenia is leading with a final index value of 0.019, and Russia is the most closed for investment with a value of 0.257. [the index is calculated as an integral value of assessment for several sectors of the economy, in the range from 0 (openness) to 1 (closeness)].

Nevertheless, Armenia is slightly behind Russia in terms of FDI per capita and significantly behind Kazakhstan. According to UNCTAD, the share of FDI stock as of 2018, as a percent of GDP, amounted to 44% in Armenia, 35% in Belarus[18], 87.5% in Kazakhstan[19], 48.4% in Kyrgyzstan[20], 25% in Russia[21].

[17] OECD FDI Regulatory Restrictiveness Index. URL: https://stats.oecd.org/Index.aspx?datasetcode=FDIINDEX# (accessed on 05.03.2020).

[18] UNCTAD. Investment Policy Review: Armenia, p. 3. URL: https://unctad.org/en/PublicationsLibrary/diaepcb2019d3_en.pdf (accessed on 05.03.2020).

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Table 3

Factors of FDI attractiveness in EAEU countries

	Armenia	Kazakhstan	Kyrgyzstan	Russia
Property rights	4.8	4.4	3.5	3.7
Quality of road infrastructure	3.6	3.6	3.1	3.5
Inflation	1.7	6.7	2.4	3.3
Skillsets of graduates	3.7	3.8	3.2	4
Ease of finding skilled employees	4	4.1	3.6	4.5
Extent of market dominance	4.6	3.8	3.4	3.7
Competition in services	5.5	4.9	4.1	5.5
Prevalence of non-tariff barriers	4.4	4.5	4.1	4.1
Complexity of tariffs	4.2	4.3	3.6	3.7
Border clearance efficiency	2.6	2.7	2.8	2.4
Cost of starting a business % of GDP per capita	0.8	0.3	1.9	1.1

Source: Based on the WEF Global Competitiveness Report 2019.

According to the indicator of accumulated FDI for 2014–2017 in Armenia, Russia leads (42%) and followed by EU countries (20%)[22]. By the same indicator, the mining industry, housing, and real estate, and the public utility industry are leading among the sectors of the economy. At the same time, as of the end of 2018, Russia (63.8%) and the United Kingdom (19.7%) are leading in terms of net FDI inflows to Armenia, although in the previous two years there was a negative indicator of net FDI inflows from Russia[23]. The inward investments in Armenia largely depend on the representatives of the diaspora, who invest in emerging sectors. In general, the main industries attracting FDI for two decades have been mining, energy, banking, ICT, and real estate[24]. UNCTAD analysts highlight corruption, an ineffective judicial system, anti-competitive practices impunity, and a number of other institutional weaknesses, which, however, tend to change for the better.

The mining industry is traditionally the leading sector in attracting FDI in Kazakhstan (56.3% of total FDI as of 2018), followed by the manufacturing industry (14.3%). According to 2018 data, the main investors in Kazakhstan are the Netherlands (30.1%), the USA (23%), China (7%)[25]. The growth of oil production and service sector is the key driver for the economy of Kazakhstan.

[22] UNCTAD. Investment Policy Review: Armenia, p. 5. URL: https://unctad.org/en/PublicationsLibrary/diaepcb2019d3_en.pdf (accessed on 05.03.2020).

[23] Statistical Committee of the Republic of Armenia. External Economic Activity, p. 535. URL: https://www.armstat.am/file/doc/99516823.pdf (accessed on 05.03.2020).

[24] UNCTAD. Investment Policy Review: Armenia, p. 2. URL: https://unctad.org/en/PublicationsLibrary/diaepcb2019d3_en.pdf (accessed on 05.03.2020).

[25] The National Bank of Kazakhstan website. URL: https://nationalbank.kz/?docid=680&switch=russian (accessed on 14.04.2020).

Table 4

Macroeconomic indicators of FDI attractiveness in EAEU countries

	Armenia	Belarus	Kazakhstan	Kyrgyzstan	Russia
Market size, GDP (PPP), USD million, 2018*	30530.74	189658.43	509544.26	24535.04	4050785.54
Population, thousands, 2018**	2951.78	9483.50	18272.43	6322.80	144478.05
Final consumption, % of GDP, 2018***	92.7	69.5	58	99.2	66.7
Foreign trade turnover, % of GDP, 2018****	91	139	63	101	52
Political stability and absence of violence/terrorism *****	30.48	58.10	45.71	25.24	29.05
Economic freedom index******	70.6 (ranks 34th)	61.7 (ranks 88th)	69.6 (ranks 39th)	62.9 (ranks 81st)	61 (ranks 94th)

Source: Based on the World Bank database, The Worldwide Governance Indicators, 2020 Index of Economic Freedom.

*Notes:** The World Bank. GDP, PPP. URL: https://data.worldbank.org/indicator/NY.GDP.MKTP.PP.CD?most_recent_value_desc=true (accessed on 05.03.2020).

** The World Bank. Population, total. URL: https://data.worldbank.org/indicator/SP.POP.TOTL?most_recent_value_desc=true (accessed on 05.03.2020).

*** The World Bank. Final consumption expenditure. URL: https://data.worldbank.org/indicator/NE.CON.TOTL.ZS?most_recent_value_desc=true (accessed on 05.03.2020).

**** The World Bank. Trade. URL: https://data.worldbank.org/indicator/NE.TRD.GNFS.ZS?name_desc=false (accessed on 05.03.2020).

***** The World Bank. Worldwide Governance Indicators. URL: https://info.worldbank.org/governance/wgi/ (accessed on 05.03.2020).

****** The Heritage Foundation. 2020 Index of Economic Freedom. URL: https://www.heritage.org/index/ranking (accessed on 05.03.2020).

Exports of labor services, gold, and trade based on imports and re-exports are considered the drivers of economic growth in Kyrgyzstan. Accordingly, the main directions of foreign investment in Kazakhstan are oil, gas, coal and metals, and mining and construction[26].

In general, analysts cite the low cost of labor, the availability of natural resources, the potential of various sectors of the economy, large market size, and a number of other features as the factors of investment attractiveness of the Central Asian countries. The limiting circumstances are high exchange rate volatility, corruption, poor rule of law, and a non-transparent regulatory system[27].

The United States, Germany, and China are the biggest foreign investors in Russia[28], with manufacturing, trade, and mining be-

[26] Research and Knowledge Management Sector "Samruk Kazyna". Review of Investment Attractiveness of Central Asian Countries, p. 13. URL: https://sk.kz/upload/iblock/d34/d34cfc911970b45c9b695e392a7d250a.pdf (accessed on 12.04.2020).

[27] See above. p. 16.

[28] Statista portal. URL: https://www.statista.com/statistics/915431/leading-countries-investing-in-russia/ (accessed on 12.04.2020).

ing the most attractive for investment[29]. The United States, as one of the key investors in the Russian economy, cites fundamental structural problems of economic regulation –– in particular, judicial bias and, as a result, the vulnerability of investor rights, as well as corruption — among the main factors that reduce investment potential along with sanctions[30]. Analysts of the World Economic Forum note significant improvement of the macroeconomic climate in Russia, which helped to overcome the impact of the 2015 crisis, low inflation, and increased the innovative potential of the country (including the extent of ICT adoption). The negative aspects of the economy are the inadequate skillsets of graduates, the underdeveloped financial sector and insufficient access to financial resources for business[31].

Russia is the key FDI investor for Belarus, which accounted for 31% in 2019 and 55.4% of total FDI in 2019. In addition, 17.6% of FDI inflows were provided by Cyprus and 8.2% by Austria in 2019[32]. Investments are mainly made in the production and financial sectors (as of 2019)[33]. Nonetheless, FDI inflows into the country are constrained by the dominance of the state-owned enterprises and unwritten practices that may discriminate against the investors[34].

In general, a number of factors have been identified that negatively affect FDI in the EAEU countries. In most cases, these are ineffective institutions that provide investor protection, poor rule of law, and other quality indicators. It is also noted that the low efficiency of institutions largely depends on the quality of macroeconomic regulation in general. Below is a model for assessing the impact of some factors of investment attractiveness on FDI in the EAEU countries, taking into account political stability and the absence of violence/terrorism[35], which, as shown in the table, are at a fairly low level for all countries.

MODEL SPECIFICATION

Based on the analysis and generalization of studies devoted to assessing the impact of various factors of investment attractiveness on the inflow of FDI into the country, a pooled model was chosen to assess similar indicators for the EAEU countries. The model is based on a similar study for the BRICS and MINT countries by S. Asongu, U.S. Akpan, S.R. Isihak [1]. The sample consists of five EAEU countries and includes data for the 2009–2018 time period, covering the period after the 2007–2008 global financial and economic crisis until present time (subject to data availability). The choice of variables is ensured by similar research and data availability, for example, factors used in the Global Competitiveness Report are excluded from the analysis due to the absence of the data for Belarus. The net FDI inflow in absolute terms (according to the World Bank) was chosen as the explanatory variable.

Thus, the equation for assessing the factors of investment attractiveness of the EAEU countries includes such variables as:

- LNETFDI — logarithm of net FDI inflows in US dollars;
- lgdp — logarithmic GDP (PPP) per capita (as a level of a country's productivity);
- TRADE — foreign trade turnover (export and import) as a percentage of GDP;

[29] Compiled by author on the basis of data on the balance of payments of the Russian Federation, Q3 2019. URL: https://www.cbr.ru/statistics/macro_itm/svs/ (accessed on 12.04.2020).

[30] US Department of State. 2019 Investment Climate Statements: Russia. URL: https://www.state.gov/reports/2019-investment-climate-statements/russia/ (accessed on 12.04.2020).

[31] Schwab K. The Global Competitiveness Report 2019. Switzerland: World Economic Forum; 2019. URL: http://www3.weforum.org/docs/WEF_TheGlobalCompetitivenessReport2019.pdf (accessed on 12.04.2020).

[32] National Bank of the Republic of Belarus. URL: https://www.nbrb.by/statistics/foreigndirectinvestments (accessed on 17.04.2020).

[33] Ministry of Economy of the Republic of Belarus. URL: https://www.economy.gov.by/ru/pezultat-ru/ (accessed on 17.04.2020).

[34] US Department of State. 2019 Investment Climate Statements: Belarus. URL: https://www.state.gov/reports/2019-investment-climate-statements/belarus/ (accessed on 12.04.2020).

[35] Worldwide Governance Indicators. URL: https://info.worldbank.org/governance/wgi/ (accessed on 12.04.2020).

Table 5

Descriptive statistics of variables

Variable	Obs	Mean	Std. Dev.	Min	Max
lgdp	50	9.402 305	.7878436	7.913184	10.23566
LNETFDI	49	21.54895	1.829789	18.78687	24.96054
TRADE	50	87.81837	33.80055	46.19336	157.9743
INFL	49	9.133648	10.78244	–1.403608	59.21974
INET	48	49.63053	20.95837	15.3	80.86472
Cfinal	50	79.46328	18.15879	52.66706	115.9065
Tered	47	61.32182	18.08035	41.26702	93.54328
lpolit	50	3.465694	.4720913	2.625359	4.28375

Source: Author`s calculations.

• INFL — annual inflation rate based on the consumer price index;

• INET — a share of Internet users in the total population (as an indicator of the development of digital infrastructure);

• Cfinal — a share of final consumption expenditures in GDP (as an indicator of volumes of domestic demand);

• Tered — a share of those completing tertiary education in the adult population;

• lpolit — logarithm of the political stability index published annually by the World Bank regarding World Governance Indicators.

The source of statistics for all indicators, except the last one, is the World Bank database. Thus, the model for assessing the dependence of FDI inflows to the EAEU countries on the listed factors is as follows:

$$LNETFDI = \beta 0 + \beta 1 * \lg dpit + \beta 2 * TRADEit + \beta 3 * INFLit + \\ + \beta 4 * INETit + \beta 5 * Cfinalit + \beta 6 * Teredit + \beta 7 * lpolitit + \varepsilon it,$$

where *i* and *t* correspond to each specific country and time (all data are taken on an annualized basis).

Presumably, there is a positive relationship between the FDI inflows and the GDP per capita, the economic openness, the number of Internet users, the consumer spending, and the level of education in this formula. As for inflation, the relationship should be negative, since the price level is an indicator of general macroeconomic stability, and a consistently low price level attracts investors. The descriptive data of the EAEU countries are presented in *Table 5*.

The least squares linear regression model was built, based on the available statistical data and observations, using the econometric package Stata 14 (*Table 6*).

The results of the model with a coefficient of determination equal to 0.9774 (the adjusted coefficient is equal to 0.9729) lead to the following conclusions: all variables included in the calculation are statistically significant at the 5% significance level. At the same time, the rate of inflation is less significant compared to other variables included in the model. Also, political stability has the greatest effect on the volume of investments. Final consumption expenditure and economic openness have an adverse effect on the growth of FDI flows. By contrast, inflation is an indicator that has a positive effect on foreign investment. Thus, the calculations override the initial assumption that there was a positive effect of open-

ness on FDI flows and a negative effect of inflation on the investment attractiveness of a country. A similar contradicting result was obtained for the BRICS countries, while for the MINT countries, on the contrary, the effect of inflation was positive, and the effect of the volume of foreign trade was negative [1]. However, the impact of these two indicators on FDI inflows in the EAEU countries is almost half as much as the impact of indicators of the share of Internet users in the country and the share of people with higher education, which is in line with the findings of some of the empirical studies cited above.

CONCLUSIONS

The analysis of a number of studies devoted to the factors affecting the investment attractiveness of the country showed that, despite the obvious links between macroeconomic indicators, they manifest themselves differently in various economies. Most experts identify a number of general factors significant for attracting FDI: market capacity, population size, degree of economic openness, inflation, taxation, exchange rate stability, etc. However, practical analysis shows that the countries successful in attracting FDI differ significantly in terms of absolute indicators of market capacity, population, final consumption expenditures, and economic openness.

In most cases, institutional instability hinders foreign investment. The experience of the countries successful in attracting FDI and the EAEU countries showed that the effective functioning of institutions of political and economic regulation has a more significant effect than a number of macroeconomic indicators. In particular, the negative factors noted in a number of studies are non-transparent regulatory policies, the dominance of state ownership, and the absence of an adequate system for protecting the rights of investors, poor rule of law, and violated economic freedoms. The assessment of some factors of the investment attractiveness of the EAEU countries showed that the factor of political stability is more statistically significant than the inflation rate. Similar to the BRICS countries, the factor of foreign trade volume turned out to be negative, which can also be explained by the negative effect of the final consumption expenditures. High volumes of imports are reflected in final consumption expenditures and contribute to the country's foreign trade turnover indicating that the country's consumption is covered by external production. In general, the analysis based on the Global Competitiveness Report, the index of economic freedom and perception of corruption, allows us to conclude that the qualitative components of investment attractiveness prevail over the quantitative ones. Institutional factors are key to macroeconomic indicators. In most cases, macroeconomic factors are ensured by effective or ineffective institutions, while extensive factors of production, such as population size, large territories, or large volumes of accumulated capital, are not important. At the same time, future study of the problems of attracting FDI should take into account the trends of mass digitalization, since the introduction and expansion of digital technologies are becoming an integral part of the competitiveness of the modern economy.

Table 6

Results of model calculation

Dependent Variable: LNETFDI
Number of obs.: 43
Prob > F = 0.0000
R2 = 0.9774
R2 adj = 0.9729

Lgdp	Coef,	Std, Err,	P > |t|
TRADE	–.0052522	.0009634	0.000
INFL	.0030723	.0024803	0.224
INET	.0094807	.0014568	0.000
Cfinal	–.0178806	.0028211	0.000
Tered	.0081197	.001556	0.000
Lpolit	.2140023	.0634815	0.002
_cons	7.947582	1.007293	0.000

Source: Author`s calculations.

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